



SMALL PROCUREMENT DOCUMENTS

for Construction Related Professional Services - RFP, Proposal & Award per
AS 36.30.320 and 2 AAC 12.400

PART A - REQUEST FOR PROPOSALS

NOTE: State Small Procurement Limit is \$200,000; FHWA/FAA/FTA Small Procurement Limit is \$150,000

GENERAL INFORMATION

These documents consist of three parts (Part A - Request for Proposals; Part B - Proposal Form; Part C - Contract Award, Notice to Proceed & Invoice Summary), -- **plus the current edition dated March 2014 of the Standard Provisions Booklet** (DOT&PF Standard Provisions for Small Procurements of Construction Related Professional Services) that is hereby incorporated by reference. The Booklet will not be distributed with any of the three parts; however, a

copy may be obtained on our website at the following link: <http://www.dot.state.ak.us/procurement>. The Booklet contains copies of the Small Procurements Procedure (Chapter 2 of the PSA Manual), Appendix A (General Conditions), Appendix C (Compensation), Exhibit C-1 (Methods of Payment), Appendix D (Indemnification and Insurance), and Appendix E (Certification for Licenses and Insurance).

Project Title: ANC Runway 15/33 Rehabilitation – Electrical Design Services		Contracting Agency:	
IRIS Program No: Z590490000 Federal No: AIP 3-02-0016-XXX-20XX		State of Alaska DOT&PF - Central Region 4111 Aviation Avenue Anchorage, AK 99502	
Project Site (City, Village, etc.): Anchorage, Alaska		RFP #25172045	
Agency Contact: Luke S. Bowland, P.E.		Phone: 907-269-0891 Fax: 907-243-6927	
Estimated Amount of Proposed Contract:		<input type="checkbox"/> less than \$50,000 <input checked="" type="checkbox"/> \$50,000 to \$100,000 <input type="checkbox"/> \$100,000 to \$150,000 <input type="checkbox"/> \$150,000 to \$200,000	
Funding Source (check all that apply): <input checked="" type="checkbox"/> State <input type="checkbox"/> FHWA <input checked="" type="checkbox"/> FAA <input type="checkbox"/> FTA <input type="checkbox"/> Other:			
REQUIRED SERVICES: <input checked="" type="checkbox"/> are described in the enclosure consisting of fifteen (15) pages, dated 4/4/2017. The following additional information is available for review and may be downloaded from the RFP site: <ol style="list-style-type: none">(1) As-Built AIA Runway 14-32 Rehab & AIA N-S Taxiway, Taxiway W,S,T, & U Interlinks (Project Nos 55252 & 55799), dated 9/21/2005(2) As-Built ANC Taxiway R Rehabilitation (Project No. 56580), dated 7/30/2007(3) Conformed Plans AIA Taxiway R & Taxiway T Improvements (Project Nos. Z575900000 & Z576060000), dated April 2016(4) Conformed Plans ANC Taxiway Y Reconstruction (Project No. CFAPT00131), dated 2/24/2017 OR: <input type="checkbox"/> are described as follows: Note to Proposers: Any proposer listing as a member of their team a current public officer or a former public officer who has left State service within the past two (2) years must submit a sworn statement from that individual that the Alaska Executive Branch Ethics Act does not prohibit his or her participation in this project. If a proposer fails to submit a required statement, the proposal may be deemed nonresponsive or nonresponsible, and rejected, depending upon the materiality of the individual's proposed position. If required, submit the attached Former Employee's Certification of Eligibility (Form 25A270). The page limit noted below does not include this form. Note: Offerors shall carefully review this solicitation for defects and questionable or objectionable material. Comments concerning defects and objectionable material must be made in writing and received by the purchasing authority before proposal due date. This will allow issuance of any necessary addenda. It will also help prevent the opening of a defective solicitation and exposure of Offeror's proposals upon which award could not be made. Protests based upon any omission, error, or the content of the solicitation will be disallowed if not made in writing before the proposal due date.			
PERIOD OF PERFORMANCE:		Begin: May 2017 End: January 2018	

PROPOSAL FORMAT

Written proposals to provide the required services shall consist of the enclosed "Part B - Proposal Form," completed as indicated, plus a **letter not to exceed five (8.5" x 11") pages**. If a Price Estimate

is required, the page limit does not include the Price Estimate. Proposals that exceed the page limit may be disqualified. Proposals may be faxed or hand delivered to the Contracting Agency.

PRICE AND METHOD OF PAYMENT

☒ **A Price Estimate is NOT required with your proposal.** The selected Offeror shall submit a Price Estimate within **one** business day following a request from the Contracting Agency.

☐ **A Price Estimate is required with your proposal.**

A Price Estimate shall be prepared in the format shown below. Note that a Price Estimate is not a bid. It is a negotiable offer. A Fixed Price Plus Expenses contract is desirable; however, a Cost Reimbursement contract may result if a Fixed Price cannot be negotiated.

PRICE ESTIMATE FORMAT (if required per above)

1. * Direct Costs of Direct Labor (DCDL). Provide a table with the following columns (Names required only for key staff and persons "in-responsible-charge"):

Job Classification	Name	Total Hours	Rate (\$/hr) *	Estimated Cost (\$)	Total DCDL \$
--------------------	------	-------------	----------------	---------------------	---------------
 2. * Indirect Costs (IDC). IDC Rate: ____% Total IDC \$
 3. Subcontracts. List each, the amount for each and **attach an estimate in this format for each**. Total Subcontracts \$
 4. Expenses. (Equipment, transportation, food and lodging, reproduction, etc. - if not included in Indirect Costs.) Amounts shall be based on actual cost to the Offeror, without any profit or other markup. Provide a table with the following columns:

Item	Quantity	Cost (\$/Unit)	Estimated Cost (\$)	Total Expenses \$
------	----------	----------------	---------------------	-------------------
 5. * Total Estimated Cost. Sum of DCDL + IDC + Subcontracts + Expenses. Total Cost \$
 6. * Proposed Fee. List a proposed **amount** (not a percentage) for profit. Fee \$
 7. Total Estimated Price. Sum of Total Estimated Cost plus Proposed Fee. Total Price \$
- * Sole proprietorships and small firms that do not maintain an accounting system that separately identifies costs for "payroll" benefits and overhead, for routine allocation of such costs to jobs, may omit items 2, 5, & 6 if the Rates (\$/hr) in Item 1 are proposed as Billing Rates (DCDL + IDC + FEE). Firms that routinely allocate Indirect Costs to projects may not use Billing Rates for this estimate.

SUBMITTAL DEADLINE AND LOCATION

DATE: **April 28, 2017**

PREVAILING TIME: **4:00 p.m.** FAX #1: **(907) 269-0402**

OR FAX #2: **(907) 269-0425**

Hand deliver proposal directly to following location, and person, if named; or Fax to a number above:

State of Alaska
Department of Transportation & Public Facilities
Attn: Kathleen A. Bridenbaugh, PSA Unit Supervisor
4111 Aviation Avenue
Anchorage, AK 99502

Late proposals will not be considered. **Offerors** are responsible to assure timely delivery and receipt and **are encouraged to respond at least four business hours prior to the above deadline**. Any addendum issued less than 24 hours prior to a Deadline will extend that Deadline by a minimum of an additional 24 hours. The Contracting Agency shall not be responsible for any communication equipment failures or congestion and will not extend the deadline for any proposals not received in their entirety prior to the deadline. Except for hand delivered proposals, confirmation of receipt by telephone or other means four hours or less prior to deadline will **not** be provided. (An out-of-town/state Offeror may electronically transmit their proposal to a local personal representative who may reproduce a copy of it and deliver it "in person" to the submittal location prior to the deadline.)

BASIS OF SELECTION

This solicitation does not guarantee that a contract will be awarded. All proposals may be summarily rejected. Our intent, however, is to select a Contractor based on the following criteria:

- 1) Demonstrated comprehension of required services and proposed strategy for performance.
- 2) Relevant experience and credentials of proposed personnel including any subcontractors.
- 3) Reasonableness of proposed schedule for performance.
- 4) Price Estimate (**if** required with proposal).
- 5) Other (specify): None

Proposals will be evaluated per Chapter 2 of the DOT&PF PSA Manual.



SMALL PROCUREMENT DOCUMENTS PART B - PROPOSAL FORM

THIS COMPLETED FORM MUST BE THE FIRST PAGE. NO OTHER COVER SHALL BE USED.

Project Title: ANC Runway 15/33 Rehabilitation – Electrical Design Services
RFP No.: 25172045

PROPOSAL REQUIREMENTS

Proposals shall demonstrate comprehension of the objectives and services for the proposed contract; include a brief overview of what will be done; and show a sequence and schedule for each important task. Assumptions made in formulation of the proposal and the support expected from the Contracting Agency shall be defined. The key individuals who will perform services shall be named (including all who would be "in responsible charge" (Ref: AS 08.48) for Architecture, Engineering and/or

Land Surveying with their Alaska registration number). Include a brief -- about one paragraph -- statement for each person named which describes **experience directly related** to the service(s) they will perform. Proposed subcontracts, if any, shall be explained. Resources -- support personnel, facilities, equipment, etc. -- current and projected workload could be summarized. Any **unique** qualifications or knowledge of the project, project area, or services to be provided, should be identified.

ALASKA STATUTORY PREFERENCES

☐ are ☒ are not applicable to this contract.

If applicable, check those preferences that you (Offeror) claim.

☐ Alaska Bidder (Offeror) **AND>>** ☐ Veterans **AND >>** ☐ Employment Program **OR** ☐ Disabled Persons

2 AAC 12.260(d)

AS 36.30.175 if applicable AS 36.30.170(c)

AS 36.30.170 (e & f)

Invalid claim(s) will result in the Offeror's disqualification for contract award.

PROPOSAL

The undersigned has reviewed Part A - RFP of these documents, understands the instructions, terms, conditions, and requirements contained therein and in the Standard Provisions Booklet, and proposes to provide the required services described in Part A in accordance with the attached letter which constitutes our proposal to complete the project.

By my initials below, I certify that the Offeror and all Subcontractors identified in the Proposal shall comply with all requirements for the following items as explained in the Standard Provisions Booklet:

- [] Alaska Licenses and Registrations.
- [] Insurance, including Workers' Compensation, Comprehensive or Commercial General Liability, and Comprehensive Automobile Liability.
- [] Professional Liability Insurance as follows:
 - ☐ As available.
 - ☒ Minimum of \$300,000.
- [] Certification for Federal-Aid Contracts Exceeding \$100,000 (DOT&PF Form 25A262 Appendix A, General Conditions)

For Small Procurements over \$50,000, by signature on this form, the Offeror certifies that all services provided under this contract by the Contractor and all Subcontractors shall be performed in the United States. If the offeror cannot certify that all work is being performed in the United States, the Offeror must contact the Contracts Officer to request a waiver at least 24 hours prior to proposal deadline. The Offeror must provide with their submission a detailed description of the portion of work being performed outside the United States, where, by whom, and the reason the waiver is necessary. Failure to comply with

this requirement may cause the state to reject the proposal as non-responsive, or cancel the contract.

I further certify that I am a duly authorized representative of the Offeror; that this Proposal accurately represents capabilities of the Offeror and Subcontractors identified for providing the services indicated. I understand that these Certifications are material representations of fact upon which reliance will be placed if this contract is awarded and that failure to comply with these Certifications is a fraudulent act. The Contracting Agency is hereby authorized to request any entity identified in this proposal to furnish information deemed necessary to verify the reputation and capabilities of the Offeror and Subcontractors. This proposal is valid for at least ninety days.

Signature **and Date**

Name..... :
Title :
Offeror (Firm)..... :
Street or PO Box :
City, State, Zip..... :
Telephone - Voice :
Telephone - Fax :

Federal Tax Identification No..... :

Type of Firm (Check one of the following):

- ☐ Individual ☐ Partnership
- ☐ Corporation in state of..... :
- ☐ Other (specify)..... :

END OF PART B

PROPOSED STATEMENT OF SERVICES

APPENDIX B

IRIS Program No:	Z590490000
Federal Project No:	AIP 3-02-0016-XXX-20XX
Date Prepared:	4/4/2017

ANC Runway 15/33 Rehabilitation - Electrical Design Services

RFP 25172045

ARTICLE B1

INDEX AND DEFINITIONS

B1.1 Index of Articles

<u>Article</u>	<u>Group</u>	<u>Task #</u>	<u>Subject</u>
B1			Definitions
B2			Exhibits
B3			Codes, Regulations, Standards, and Procedures
B4			Administrative Requirements
B5			Management
B6			Project Location and Description
B7			Summary of Contract Services
B8			Design Engineering
B8.10.1	A	1	Plans in Hand (PIH) Review
B8.10.2	A	2	Plans, Specifications, and Estimate (PS&E) Review
B8.10.3	A	3	Final PS&E
B9	A	4	Assistance During Bidding
B10	B	5	Assistance During Construction

B1.2 Definitions

Contracting Agency	DOT&PF Project Management Team
Contractor	Design Contractor
DOT&PF	Alaska Department of Transportation and Public Facilities
Functional Groups	DOT&PF Design support sections (Environmental, Right-of-Way, Utilities, etc.)
Project Manager	DOT&PF Contract Manager
ANC	Ted Stevens Anchorage International Airport
FAA	Federal Aviation Administration

ARTICLE B2

EXHIBITS

Exhibit B-1	Project Location Maps
Exhibit B-2	Project Schedule

ARTICLE B3

CODES, REGULATIONS, STANDARDS AND PROCEDURES

B3.1 General

Perform all studies, reports, and design services in accordance with applicable codes, regulations and standards; professional practice procedures; and commonly recognized construction methods. Consider the geographical location of the project as well as other environmental and site specific constraints when performing services for this project.

B3.2 Standards and Guidelines

Publications that contain the current aviation design standards and guidelines are referenced throughout this Statement of Services. During the period of this agreement these documents may be supplemented, deleted, or revised.

B3.3 Units of Measurement

Use U.S. Customary units of measurement throughout development of the project.

ARTICLE B4

ADMINISTRATIVE REQUIREMENTS

B4.1 General

This contract is divided into several tasks. Provide services as identified and authorized by sequentially numbered Notices-to-Proceed (NTP). Do not perform services or incur billable expense except as authorized by an NTP. There is no guarantee that all tasks will be accomplished. The contract may terminate at any stage found to be in the Contracting Agency's best interests.

B4.2 Duplicate Requirements

In combining all the tasks into one contract, duplicate requirements may be encountered during project development in regards to reports, drawings, activities, etc. No duplication is intended. Coordinate all work items internally and with the Contracting Agency to maximize the results from work efforts and eliminate any perceived duplication.

B4.3 Project Staff

All services must be performed by or under the direct supervision of the individuals listed below. Replace, add, or change Project Staff named below only with prior Contracting Agency written approval.

Name

Company

Project Responsibilities

Contract/Project Manager

Electrical Engineering

B4.4 Professional Registration

Prepare all reports, plans, specifications, estimates and similar work products by or under the supervision of an Engineer currently registered in Alaska.

B4.5 Billing Reports

Submit billings before the 15th of each month. Provide a two-page (typical) report with each monthly billing for months in which services are performed in a format the Contracting Agency approves. Specifically describe

the work completed, problems encountered, and the focus of the effort ahead for prime and subconsultants. For each task, list the dollars expended to date, the remaining dollars needed to complete it, and the estimated percent complete. Include supporting documentation such as receipts for reimbursable expenses and a summary of labor charges with all costs clearly identified. Clearly explain in the report any delayed costs from previous billing periods that are included in the current billing.

B4.6 Correspondence

Include the project name and numbers (State & Federal) on all correspondence pertaining to the project. Provide copies of all outgoing correspondence and originals of all incoming correspondence to the Contracting Agency at least once a week.

B4.7 Documents and Reports

Prepare documents with solid black letters and double-spaced lines on white, 8.5 inch x 11-inch bond paper. Other size paper may be used for illustrations if they are folded to 8.5 inch x 11-inch size. Print original documents and reports on one side of the paper only. Do not use photographs or multicolored graphics except as specifically approved by the Contracting Agency. Deliver original, camera-ready copies of final documents and reports to the Contracting Agency for a check before printing. Use "active voice" verb forms when writing documents and reports where feasible.

In addition to the hard copy deliverables, submit all final documents and reports in digital form as pdf files and as document files for current version of Microsoft Word (or appropriate Microsoft Office product).

B4.7.1 Reproduction and Distribution. When the contract requires only the original or only one copy of a work product to be delivered, the Contracting Agency will reproduce and distribute any other copies required. Deliver items for reproduction single-sided, organized, and camera ready for copying and not stapled or otherwise bound. The Contracting Agency will be responsible for the distribution of all draft and final reports produced under this contract.

B4.7.2 Paper Copies. When the contract calls for more than one copy of documents or reports, print copies on both sides of the paper. However, print the cover and pages with approved illustrations, multicolored graphics, photographs, or estimates on one side of the page only. Comb-bind all copies; do not bind originals. For reviews, bind copies of estimates as the first item behind the cover of the specifications.

B4.7.3 Digital Copies. The Contracting Agency uses Microsoft Windows, Microsoft Office Suite (Word, Excel, et al.) and AutoCAD Civil 3D 2016 software. Submit all digital files in formats fully compatible with the Contracting Agency's software. Provide formal submittals on CD-R(W) or as approved by the Project Manager. Provide informal digital submittals as approved by the Project Manager, usually as e-mail attachments.

B4.7.4 Page Numbers. Number pages in all documents to allow every major Section, Chapter, Appendix, etc., to begin on a "right hand," odd numbered page.

B4.7.5 Covers. Include the following on the cover of all documents and reports:

- a. Name of document or report
- b. Date
- c. Indicate whether draft or final
- d. Project Name
- e. State and Federal Project Number(s)
- f. Prepared for: Alaska Department of Transportation and Public Facilities
- g. Prepared by:
- h. Map and/or picture of project area

B4.8 Plans, Maps, and Plats

Submit with solid black ink on 11 x 17-inch bond paper. Submit final drawings on 11 x 17-inch bond paper and in .pdf format.

B4.8.1 Drafting. Submit all drawings as AutoCAD Civil 3D 2016 drawing files and plot files. Submit draft and final drawing and plot files on CD ROM disks. The Contracting Agency will provide the project titleblock and standard templates with layering schemes and plot files for Contractor use. Use drafting procedures outlined in the current *Central Region Aviation Design Drafting Guide* (DOT&PF, 2017).

B4.8.2 Contractor Name on Plan Sheets and Documents. Include the following information on all documents required to be signed and sealed:

- a. Company name, physical address, and telephone number;
- b. Certificate of authorization number issued to the corporation, limited liability company, or limited partnership to practice engineering, land surveying, or landscape architecture, if applicable.

No Contractor logos are allowed on any electronic or hard-copy document produced for the Contracting Agency. Contractor letterhead is allowed only in exhibits in document appendices. Include Contractor name in the same font as other non-emphasized lettering on the plan sheet or document. Do not exceed 1/16" in height on 11"X17" plan sheets.

B4.9 Specifications and Estimates

Submit with solid black letters that are single spaced on white, 8.5 x 11-inch bond paper. Print only on one side of the paper. Do not include graphics or photographs except as the Contracting Agency specifically approves. Also submit all specifications in both .pdf and Microsoft Word format.

B4.10 Proofreading

Prepare reports and specifications, to the greatest extent possible, free of mathematical, grammar, spelling and typographical errors. The Contractor is responsible for professional proofreading of the documents to meet the intent of this requirement. All errors and omissions in deliverables will be corrected at the Contractor's expense.

B4.10.1 Quality Assurance Memo. Provide with each submittal a Quality Assurance memo signed by the person in responsible charge for the project, certifying that he/she has performed a quality control check on the items included in the submittal. A memo template will be provided by the Contracting Agency.

B4.11 Revisions

Modify work products in response to Contracting Agency direction. Consider corrections, adjustments, or modifications indicated during the review/approval process, but which do not substantially affect the scope, complexity, or character of the services, a normal part of Contractor services.

B4.11.1 Errors and Omissions. Except as described in this Statement of Services, submit complete work products. The Contracting Agency will not accept work products having significant errors or omissions until they are corrected.

B4.11.2 Review Meetings. See B8.14.

B4.11.3 Comment Resolution. Provide with subsequent submittals a technical memo that clearly documents and explains all comments and changes from previous submittal.

B.4.12 Completion Documentation

Submit the originals of all documents prepared during project development, including those generated under all reviews, with the Final PS&E package. These documents include all notes, sketches, maps, photographs, survey data, computations (include cost computations under separate cover), cross sections, digital terrain model, electronic files, and other materials that were created to develop, record, or justify services provided for the project. Identify all assumptions made. Keep a copy of all the documents until construction is complete.

B4.12.1 Source Document Reference. Include sufficient information in documents created to determine pay item quantities to allow the quantity for each pay item to be checked by starting from the source document. Reference these documents to the applicable pay item.

B4.12.2 Submittal Format. Submit completion documents in loose-leaf, three ring binders. Label them on the spine with the project name, "Completion Documents", and the binder number. Label the front of the binders with this information as well as the State and Federal project numbers and a brief description of what documents are contained in the binder. Provide dividers that sort the documents by pay item number, report, or other logical category. Number the binders sequentially and include a table of contents in the first one.

B4.13 Conflict of Interest

Do not represent any parties other than the Contracting Agency concerning this project.

ARTICLE B5 **MANAGEMENT**

Note: Do not treat this Article as a distinct task. Apportion costs associated with the services described in this Article among other tasks required to accomplish the work.

B5.1 Performance Schedule

Perform work in accordance with the project schedule in Exhibit B-2.

B5.1.1 Timely Information

Provide timely information to the Contracting Agency for project-related services performed by Contracting Agency functional groups.

B5.1.2 Schedule changes

Expend every effort necessary to stay on schedule and to meet the contract delivery dates. Any schedule changes must be approved by the Project Manager.

B5.1.3 Progress Meetings/Reports

Attend progress meetings (typically every month for about an hour) with the Contracting Agency to review progress reports, invoices, and schedule. The Contractor is responsible to:

- Provide "exception reporting" of scheduled activities that are late, suspended, or significantly accelerated.
- Explain why any activity is off schedule, or likely to become so.
- Explain what corrective action(s) are being taken.
- Discuss approaching events and milestones to be achieved over the next month at the meetings.
- Keep minutes of all meetings and submit them to the Contracting Agency within five working days.

Attendance at the meetings will be limited to:

- Contracting Agency Project Management staff and invited guests
- Contractor project engineer/manager
- Appropriate sub-consultants

B5.2 Project Coordination within DOT&PF

The Project Manager will coordinate any required services or activities with various DOT&PF functional groups and ANC staff. Do not initiate communication with functional groups or ANC staff without the prior knowledge and consent of the Project Manager. Keep the Project Manager apprised of the nature of all such communications and provide the Contracting Agency with copies of telephone records and meeting minutes. In the event any major issues or problems surface, consult the Project Manager for resolution. Provide timely responses to requests for information by the functional groups and ANC as identified within task descriptions.

B5.2.1 Federal Aviation Administration (FAA) Communication. Communications with the FAA regarding this project will be handled solely by the Contracting Agency.

B5.2.2 Contracting Agency and Public Coordination. Assist in coordinating with appropriate federal, state, and local government agencies, and the public, including special interest groups and organizations that potentially could be affected by the proposed project. Make no commitments on behalf of the Contracting Agency; any commitments for action or mitigation will be made by the Contracting Agency.

B5.2.3 Agency Meetings/Release of Information. Notify the Project Manager of all meetings with agencies, organizations, or individuals at least three working days in advance. Prior to such meetings, discuss the agenda for the meetings with the Project Manager to ensure that no inappropriate or incorrect information is disclosed. Do not release data collected under this agreement to any agency or to the public without prior approval. Document all meetings and telephone conversations concerning the proposed project. Forward original signed documents to the Project Manager.

B5.2.4 Scoping Submit all written material used to collect data for this project to the Contracting Agency for review and acceptance prior to its use or distribution.

B5.3 Right-of-Entry Permits

The Contracting Agency will obtain Right-of-Entry authorizations when required. Provide a minimum of 30 calendar days advance notice for the Contracting Agency to acquire any authorization. Should the authorizations take additional time to obtain, performance schedule(s) may be adjusted accordingly. Contractor is not entitled to any additional compensation for any delay incurred in obtaining Right-of-Entry Permits.

ARTICLE B6

PROJECT LOCATION AND DESCRIPTION

B6.1 General

The Ted Stevens Anchorage International Airport (ANC) is located on the west side of Anchorage, Alaska, and is within the boundaries of the Anchorage Municipality. See Exhibit B-1, Project Location Maps.

B6.2 Electrical Design Scope. The Contractor shall provide electrical engineering services for the following:

- Replace runway in-pavement lighting and runway edge lighting systems on Runway 15/33.

- Replace taxiway centerline and taxiway edge lighting systems on Taxiways K, L, M, W, U, T, and S at the intersections with Runway 15/33.
- Replace runway guard lighting systems on Taxiway L at the intersection with Runway 15/33.
- Replace runway guard lighting base cans and conduit on Taxiways K and M at the intersections with Runway 15/33 (existing light fixtures, transformers, and conductors to remain, where possible).
- Replace lighted runway and taxiway signs within the project area.
- Install new taxiway centerline, taxiway edge, and runway guard lighting systems on the realigned Taxiway Q and Taxiway R extension.
- Demolish existing taxiway edge lighting systems on abandoned Taxiways N, P, and Q at the intersections with Runway 15/33.
- Demolish existing FAA systems/conduit under the civil improvements noted for removal.
- Install conduit and junction boxes for new FAA systems under and adjacent to civil improvements. See Section B6.4 FAA-Owned Facilities for additional information regarding NAVID relocations.
- All electrical improvements needed to support the items listed above, which may include electrical vault modifications, constant current regulator replacements, and temporary jumper cables to keep necessary lighting circuits active during construction.
- Coordination with the plan sets for AIA Taxiway R Improvements (Project No. Z575900000), and ANC Taxiway Y Reconstruction (Project No. CFAPT00131), which are available for review.
- Coordination with the concurrently designed AIA Taxiway R Group VI Improvements (Project No. CFAPT00070). As design work is in progress, these documents will be made available to the selected Contractor at a later date.

B6.3 Civil Design. All civil engineering tasks for the project will be completed by the Contracting Agency.

B6.4 FAA-Owned Facilities. The FAA will provide the design, relocation, and/or modifications as required for FAA-owned facilities, which include, but are not limited to, underground communication and electrical lines for the glide slope relocation, approach lighting system shelter relocation, replacing the approach lighting system, REIL relocation, and PAPI relocation.

B6.5 Utilities. Design and construction of retirements, extensions, relocations, and/or modifications of utility-owned facilities, if required, will be provided under separate Utility Agreements negotiated by the Contracting Agency. See B8.7.1.

ARTICLE B7

SUMMARY OF CONTRACT SERVICES

B7.1 General

Provide professional electrical engineering services as follows:

- (1) Prepare Electrical Plans, Specifications, and Estimate (PS&E) documents and quantity calculations, as needed to support the project. This effort includes design services for bid-ready contract documents. It also includes assistance in preparation of supporting documents including, but not limited to the Engineer's Design Report (EDR) and utility agreements, if needed;
- (2) Assistance during bidding to respond to clarification requests by bidders; and
- (3) Assistance during construction to confirm that contractor submittals conform to the contract requirements and to adapt the contract as needed to unforeseen conditions.

The schedule of project milestones appearing in Exhibit B-2 applies to this contract.

B7.2 Contract does not guarantee amount of design services

The Contracting Agency does not guarantee that the Contractor will be required to provide all of the services detailed in this Statement of Services nor that the Contractor will incur all of the costs estimated in Appendix C. The Contractor may be asked to perform other services by amendment for the project beyond those defined in this contract.

B7.3 Deliverable Items.

The following is a breakdown of the Contract deliverable documents by Task number and associated Task Group:

Task Number	Section	Group A	Group B
Task 1 - PIH Review	B8.10.1	X	
Task 2 - PS&E Review	B8.10.2	X	
Task 3 - Final PS&E	B8.10.3	X	
Task 4 - Assistance During Bidding	B9	X	
Task 5 - Assistance During Construction	B10		X

ARTICLE B8 DESIGN ENGINEERING

B8.1 General

Design engineering includes: identifying feasible alternatives, evaluating these alternatives, and producing supporting documents that lead to the objective of this article: a "Plans, Specifications, and Estimate" (PS&E) assembly suitable for project bidding and construction. The product must meet the standards set forth in the list of Current FAA Advisory Circulars for AIP/PFC Projects available through the following website:

http://www.faa.gov/airports/resources/advisory_circulars/

Assist in the support of the project environmental staff, as required, as they complete the required National Environmental Policy Act (NEPA) document, permitting, and other environmental clearance processes as it relates to the proposed electrical engineering design.

B8.2 Cost Effective Design

As part of the PS&E, evaluate alternatives for each major design element to determine the most cost effective design. Document the comparison of alternatives including a list of differing elements and the conclusion of the evaluation as well as the reasoning that supported the conclusion. Alternative comparisons are often based on the following issues:

- Minimum or desirable design criteria
- Right-of-Way requirements
- Utilities
- Environmental concerns including hazardous substances and wetlands
- The traveling public, both during and after construction
- Design Schedule
- Design, construction, and maintenance budgets
- Other considerations appropriate for specific circumstances

B8.3 Plan Set Composition

Assemble final plans in the order listed under Section 7.2 in the current draft of the *Central Region Aviation Design Drafting Guide* (DOT&PF, 2017) or as the Contracting Agency directs. Use detail drawings contained in the latest “State of Alaska, Department of Transportation and Public Facilities, Standard Drawings Manual” where applicable.

B8.4 Specifications

Update specifications according to the current version of the “State of Alaska, Department of Transportation and Public Facilities, Standard Specifications for Airport Construction” and the most current Federal Aviation Administration Advisory Circulars. If the Project requires materials not listed in these documents, prepare the required special provisions for Contracting Agency review and concurrence. Use performance specifications rather than method specifications whenever possible. Do not specify brand name material unless three are named, and if "or equivalent" is used, specify the criteria for judging the equivalence. **Do not specify sole source materials unless a sole source procurement authorization is obtained.** Combine these elements and submit specifications and special provisions according to prevailing policy and as further described in the contract. Digital files of standard specifications and standard modifications are available from the Contracting Agency.

B8.5 Modifications to Standards

B8.5.1 General. Provide a “Modifications to Standards” table that documents changes to FAA-approved State construction specifications. Include those that modify the provisions of Advisory Circular 150/5370-10, most recent version. Submit the table as outlined in the submittal requirements.

B8.5.2 Attorney General review of General Contract Provisions (GCPs). Separately submit modifications of GCP specifications to the Contracting Agency for approval by the State Attorney General at least 30 days prior to the Final PS&E submittal.

B8.6 Geotechnical Investigation

Geotechnical report and recommendations for the project area will be provided to the Contractor by the Contracting Agency. In addition, the Contracting Agency’s Materials Section will provide all geotechnical information needed for the project including the gathering of additional data, if required.

B8.7 Conflicts With Existing Utilities/Storm Drains

The project area may include utilities and other improvements such as: electric, natural gas, water, petroleum, communication lines, and storm drains. The Contracting Agency’s mapping includes located utility company facilities. Identify the need for utility relocations early in project development and concisely portray on the plans.

B8.7.1 Utility Relocation Design. Meet with the Contracting Agency to discuss potential utility conflicts and relocation options. The Contracting Agency is responsible for negotiation and finalization of all utility protection or relocation agreements and will make available to those designing the necessary utility relocations the following: PS&E assemblies, cross sections, and other reports, as appropriate, produced for this project. Provide assistance interpreting these documents and share other information about the project to those designing the utility relocations.

B8.7.2 Provided Items. The Contracting Agency will provide:

- Utility Locates (included in survey product)
- Negotiated Utility Agreements

B8.8 Estimate

Submit an Engineer's Estimate with each of the plan reviews. Use pay item numbers and names as given in the Standard Specifications, Standard Modifications, or Special Provisions. Obtain pay item numbers for items not listed in the Specifications from the Contracting Agency. Provide unit prices and total estimated costs for all items. The Contracting Agency will make historical records available for the determination of unit prices. Have the estimate signed and dated by both the preparer and checker. For review submittals, include copies of the estimate with the Specifications immediately behind the cover page.

B8.8.1 Confidentiality of Estimate. Do not release any information pertinent to the Engineer's Estimate, other than to the Contracting Agency, without express written authorization from the Project Manager.

B8.9 Quantity Computations

B8.9.1 General. Support each estimated quantity with written computations that detail the relevant source data, assumptions, and allowances. Ensure documents created to determine pay item quantities contain sufficient information to allow the quantity for each pay item to be checked by starting from the source document. Reference these documents to the applicable pay item. Identify the respective individuals estimating and checking each computation. In addition to computations for individual features, include summary computations where applicable.

B8.9.2 Lump Sum Estimates. Include assumptions of lump sum estimates as well as unit quantity estimates. Detail the base assumptions that have been made in the lump sums (e.g., what type and quantity of electrical components were included in a lump sum electrical work item, what was the assumed cost of discrete items included in the lump sum calculations, etc.). Ensure any cost information is excluded from the final quantity computation binder. Submit lump sum cost information with the Engineer's Estimate.

B8.10 Plans, Specifications, and Estimate (PS&E) Package - Task Group A (Tasks 1, 2 & 3)

Complete a bid-ready PS&E package as outlined below.

B8.10.1 Plans in Hand (PIH) Review - Group A (Task 1). Prepare draft contract documents addressing the primary elements the project. Provide preliminary plans and estimate for the PIH Review that are at least 75% complete.

B8.10.1a. Specification Memo. Submit a memorandum listing all specification sections to be included in the project specifications. Include all appropriate pay items and include drafts of any significant special provisions and project-specific specifications. Discuss these with the Contracting Agency before submitting the review documents. A memorandum template will be provided by the Contracting Agency.

B8.10.1b. Electrical Design Memo. Submit a design memorandum describing the preliminary electrical scope of work, design criteria, and the justification in determining the proposed electrical improvements. Identify electrical utilities included in the work, along with any utility impacts or conflicts, and provide a draft layout.

B8.10.1c. Deliverable Items – Plans in Hand Review.

Type of Document	Paragraph Reference	Paper Originals	Digital files
Plans	B4.8, B8.3	11 x 17"	AutoCAD, .pdf
Specification Memo	B4.9, B8.4	8 ½ x 11"	Microsoft Word, .pdf
Engineer's Estimate and Bid Schedule	B8.8	8 ½ x 11"	Microsoft Excel, .pdf
Quantity computations	B8.9	8 ½ x 11"	Microsoft Excel, .pdf
Electrical Design Memo	B8.10.1c	8 ½ x 11"	Microsoft Word, .pdf
Quality Assurance Memo (Signed)	B4.10.1	8 ½ x 11"	Microsoft Word, .pdf

B8.10.2 Plans, Specifications, and Estimate (PS&E) Review – Task Group A (Task 2). Revise the contract documents according to the comments and responses from the PIH Review. Provide plans, specifications, and estimate for the PS&E review that are 95%-98% complete.

B8.10.2a. Adjudicated PIH review comments. Provide the comments and responses from the PIH review meeting and a summary memo to the Project Manager. Format all responses in the past tense (e.g. "have done," "changed," etc.).

B8.10.2b. Significant change memo. Provide a memo to the Project Manager summarizing any significant design changes between the PIH review meeting and the PS&E review submittal that were not captured in the adjudicated PIH review comments.

B8.10.2c. Draft Mod to Standards memo. Provide a draft Modifications to Construction Standards memo based on the Contracting Agency's template.

B8.10.2d. Deliverable Items – PS&E Review.

Type of Document	Paragraph Reference	Paper Originals	Digital files
Plans	B4.8, B8.3	11 x 17"	AutoCAD, .pdf
Specifications and Special Provisions	B4.9, B8.4	8 ½ x 11"	Microsoft Word, .pdf
Engineer's Estimate and Bid Schedule	B8.8	8 ½ x 11"	Microsoft Excel, .pdf
Quantity Computations	B8.9	8 ½ x 11"	Microsoft Excel, .pdf
Adjudicated PIH Review Comments	B8.10.2a	8 ½ x 11" or 11 x 17"	Microsoft Excel, .pdf
Significant Change Memo	B8.10.2b	8 ½ x 11"	Microsoft Word, .pdf
Draft Mod to Standards Memo	B8.10.2c	8 ½ x 11"	Microsoft Word, .pdf
Quality Assurance Memo (Signed)	B4.10.1	8 ½ x 11"	Microsoft Word, .pdf

B8.10.3 Final Plans, Specifications, and Estimate (PS&E) – Task Group A (Task 3). Finalize the Contract documents based on comments from the PS&E review. Documents will not be accepted until comments have been addressed to the Contracting Agency's satisfaction. Provide documents that are ready for advertising for construction bids as identified below.

B8.10.3a. Final Check Set. Provide a final unsigned planset for final comments by the Contracting Agency. Incorporate any comments received into the plans before signing and sealing the final plan sheets.

B8.10.3b. Adjudicated PS&E review comments. Provide the comments and responses from the Pre-PS&E review meeting and a summary memo to the Project Manager. Format all responses in the past tense (e.g. “have done,” “changed,” etc.).

B8.10.3c. Engineering Seals. Submit final plan sheets sealed by a Professional Civil Engineer or Electrical Engineer, as appropriate, currently registered in the State of Alaska who is in responsible charge for the work. Sign plan sheets in blue waterproof ink. Digital signatures will not be accepted.

B8.10.3d. Deliverable Items – Final PS&E.

Type of Document	Paragraph Reference	Paper Originals	Digital files
Final Check Set Plans (Unsigned)	B8.10.3a	11 x 17"	.pdf
Final Signed and Sealed Plans	B8.10.3c	11 x 17"	AutoCAD, .pdf
Specifications and Special Provisions	B4.9, B8.4	8 ½ x 11"	Microsoft Word, .pdf
Engineer's Estimate and Bid Schedule	B8.8	8 ½ x 11"	Microsoft Excel, .pdf
Quantity Computations	B8.9	8 ½ x 11"	Microsoft Excel, .pdf
Adjudicated PS&E Review Comments	B8.10.3b	8 ½ x 11" or 11 x 17"	Microsoft Word, .pdf
Significant Change Memo	B8.10.2b	8 ½ x 11"	Microsoft Word, .pdf
Final Mod to Standards Memo	B8.10.2c	8 ½ x 11"	Microsoft Word, .pdf
Quality Assurance Memo (Signed)	B4.10.1	8 ½ x 11"	MS Word, pdf

B8.11 Review Meetings

The Contracting Agency will host review meetings to discuss the PS&E review comments. Attend the review meetings (PIH and PS&E) and note any discussions that resolve comments or develop consensus.

B8.11.1 Pre-meeting comment responses. The Contracting Agency will provide the Contractor a list of compiled comments two days before the review meeting. Provide preliminary responses to the comments before the review meeting to facilitate a faster review.

B8.11.2 Post-meeting comment resolution. Provide a memo to the Project Manager that lists the comments and proposed responses within two weeks after each meeting and promptly revise any draft responses according to Contracting Agency requests. Provide a finalized list of adjudicated comments and responses once comments are resolved.

B8.11.3 Adjudication Meeting. The Project Manager may elect to conduct a separate adjudication meeting to address significant comments received during the review. Attend the adjudication meeting and provide written responses to all comments received (See B8.11.2).

B8.12 Items provided to the Contractor

The Contracting Agency will provide the following:

- a. Specification Memo template
- b. Quality Assurance Memo template
- c. Modification to Construction Standards memo template
- d. Digital files of standard specifications
- e. Project titleblock (AutoCAD)
- f. Standard templates with layering schemes and plot files (AutoCAD)
- g. Civil design layouts and project basemap (AutoCAD)

ARTICLE B9

ASSISTANCE DURING BIDDING

Task Group A

(Task 4)

B9.1 General

The Contractor shall assist the Contracting Agency as requested during project bidding. Personnel who were in responsible charge for engineering and other personnel, as necessary and appropriate, shall be available to interpret and clarify documents prepared during project development and to assist with preparing any necessary addenda to the bid documents. When performing these services, do not communicate about this project with any potential bidders.

B9.2 Documents

Within one month after the bid opening, submit the original of all documents prepared or modified during bidding. Keep a copy of these documents until construction is complete.

ARTICLE B10

ASSISTANCE DURING CONSTRUCTION

Task Group B

(Task 5)

B10.1 General

The Contractor shall assist the Contracting Agency as requested during project construction and make available personnel who were in responsible charge for engineering and other personnel, as necessary and appropriate, to:

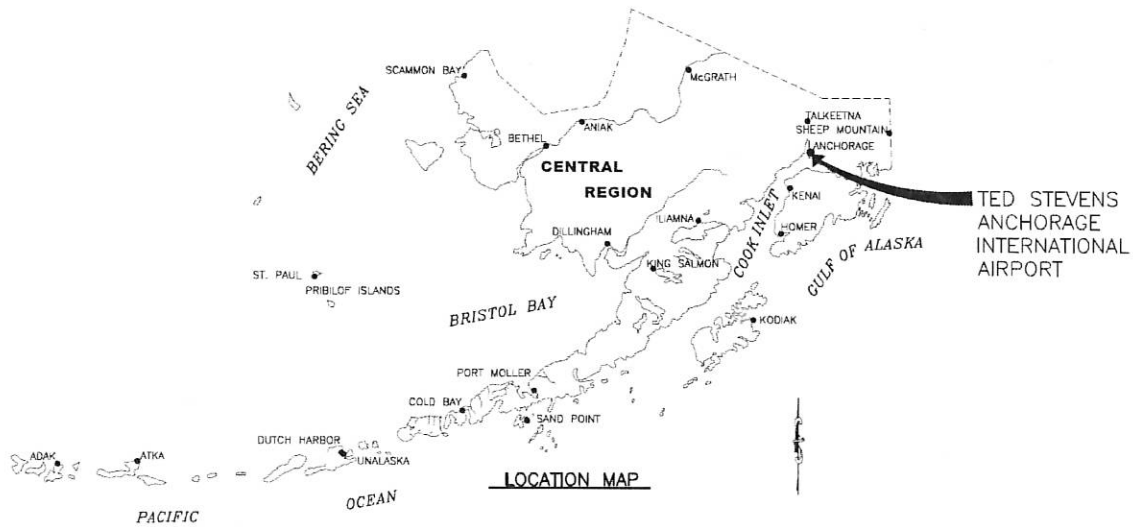
- interpret and clarify documents prepared during project development and bidding;
- review and approve shop drawings and electrical materials/catalog cuts submittals; and
- assist with preparing any necessary change order documents.

Do not communicate directly about this project with the successful bidder. Route all communication through the Contracting Agency.

B10.2 Documents

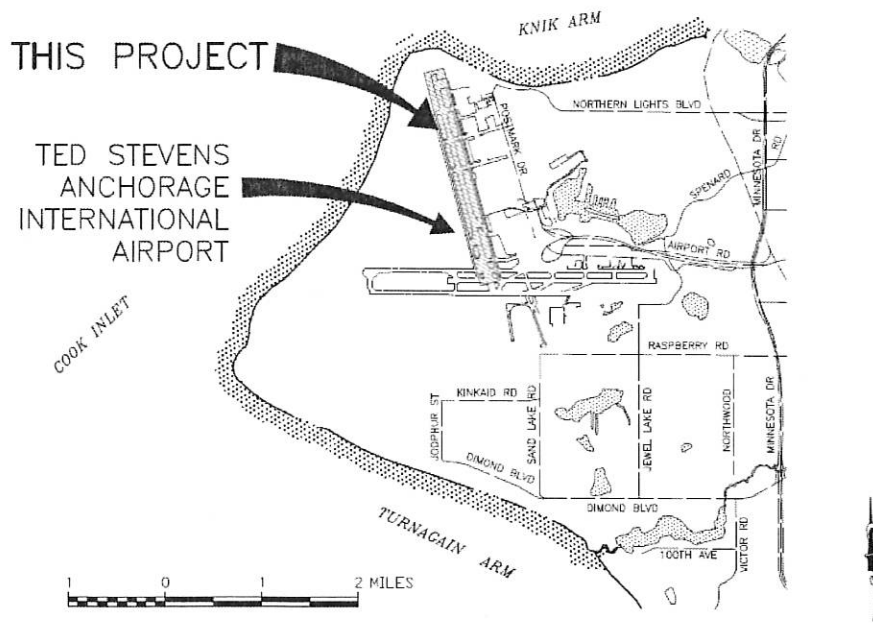
Within a month after the Contracting Agency accepts the constructed project, the Contractor shall submit the original of all documents prepared or modified when performing the services for this task.

EXHIBIT B-1 PROJECT LOCATION MAPS



ALASKA CENTRAL REGION LOCATION MAP

NOT TO SCALE



T 12 N, R 4 W SEC. 3, 4, 5, & 6
T 13 N, R 4 W, SEC. 21, 22, 27, 28, 31, 32, 34, & 35
SEWARD MERIDIAN
U.S.G.S. ANCHORAGE (A-8), ALASKA

**EXHIBIT B-2
PROJECT SCHEDULE**

Milestone	Date
PIH Submittal	June 2, 2017
PIH Review Meeting	June 20, 2017
PS&E Submittal	September 29, 2017
PS&E Review Meeting	October 17, 2017
Final PS&E Submittal	October 31, 2017
Advertising for Construction Bids	December 8, 2017